

1 4. Claims:

- 2 1. An electronic content proving method using a computer
3 system or a computer network comprising the steps of:
4 (a) a proof service provider transmitting a certificate
5 generation request to a witness or a certificate
6 generator;
7 (b) said witness or said certificate generator obtaining
8 electronic content upon the receipt of said certificate
9 generation request from said service provider; and
10 (c) generating a certificate.
- 11 2. The electronic content proving method according to
12 claim 1, wherein said certificate includes said
13 electronic content, or data that uniquely represent said
14 electronic content.
- 15 3. The electronic content proving method according to
16 claim 1, further comprising the step of
17 (d) accumulating said certificate in said service
18 provider or transmitting said certificate to a user.
- 19 4 . The electronic content proving method according to
20 claim 1, wherein said certificate includes address
21 information for said electronic content and time
22 information for said proof.
- 23 5. The electronic content proving method according to
24 claim 1, wherein said step of generating said certificate
25 includes a step of providing a signature for said
26 certificate; and wherein said signature step includes a

1 first configuration process consisting of a first
2 signature step by said witness or said certificate
3 generator and a second signature step by said service
4 provider, or a second configuration process consisting of
5 a signature step by a notary service provider.

6 6. The electronic content proving method according to
7 claim 5, wherein said signature is encrypted using a
8 public key encryption method to prevent alteration by a
9 person other than a signer.

10 7. The electronic content proving method according to
11 claim 2, wherein said data that uniquely represents said
12 electronic content is a hash code.

13 8 . The electronic content proving method according to
14 claim 1, wherein in accordance with a request from said
15 user, said certificate generation request is transmitted
16 to said witness or to said certificate generator on one
17 or multiple dates, or is transmitted continuously during
18 one or multiple specific periods.

19 9. The electronic content proving method according to
20 claim 1, wherein synchronization of time is effected
21 between said service provider and said witness or said
22 certificate generator.

23 10. A proving system for a service provider that proves
24 oneness for perusal and non-alteration of an electronic
25 content using a computer system or a computer network
26 comprising:

27 means for transmitting a certificate generation

1 request to a witness or a certificate generator;
2 means for obtaining electronic content upon the
3 receipt of said certificate generation request from said
4 service provider; and
5 means for generating a certificate.

6 11. The proving system according to claim 10, wherein
7 said certificate includes said electronic content, or
8 data that uniquely represent said electronic content.

9 12. The proving system according to claim 10, further
10 comprising means for accumulating said certificate in
11 a computer system of said service provider or means for
12 transmitting said certificate to a user.

13 13. The proving system according to claim 10, wherein
14 said certificate includes address information for said
15 electronic content and time information for said proof.

16 14. The proving system according to claim 10, wherein
17 said means for generating said certificate includes means
18 for providing a signature for said certificate; wherein
19 said signature means includes a first configuration
20 consisting of first signature means by said witness or
21 said certificate generator and second signature means by
22 said service provider, or a second configuration
23 consisting of signature means by a notary service
24 provider.

25 15. The proving system according to claim 14, wherein
26 encryption means using a public key encryption method is

1 employed for said signature means to prevent alteration
2 by a person other than a signer.

3 16. A proving system for a service provider that proves
4 openness for perusal or non-alteration of an electronic
5 content using a computer system or a computer network,
6 comprising:

7 means for accepting and for analyzing a service
8 request received from a user;

9 means for selecting a witness or a certificate
10 generator from a registered member group in which
11 witnesses or certificate generators are registered;

12 means for transmitting a certificate generation
13 request to said witness or said certificate generator
14 that is selected;

15 means for accepting a certificate from said witness
16 or from said certificate generator; and

17 means for transmitting said certificate to said
18 user.

19 17. The proving system according to claim 16, wherein
20 said means for accepting said certificate includes means
21 for providing an electronic signature for said
22 certificate.

23 18. A system for a witness or a certificate generator
24 that proves openness for perusal or non-alteration of an
25 electronic content using a computer system or a computer
26 network, comprising:

27 means for accepting a certificate generation request
28 from a user;

29 means for accessing an address of an electronic

1 content included in said certificate generation request,
2 and obtaining said electronic content;
3 means for generating a certificate including said
4 electronic content, or code that uniquely represents said
5 electronic content; and
6 means for transmitting said certificate to said
7 service provider.

8 19. The system according to claim 18, wherein said means
9 for generating said certificate includes means for
10 providing an electronic signature for said certificate.

11 20. A storage medium for storing a program code that
12 proves openness for perusal and non-alteration of an
13 electronic content using a computer system or a computer
14 network, said program code comprising:

15 a program code for, in accordance with a service
16 request from a user or a self service request,
17 transmitting a certificate generation request to a
18 witness or a certificate generator;

19 a program code for obtaining electronic content upon
20 the receipt of said certificate generation request from
21 said service provider;

22 a program code for generating a certificate that
23 includes said electronic content, or data that uniquely
24 represent said electronic content; and

25 either a program code for accumulating said
26 certificate in a computer system of said service provider
27 or a program code for transmitting said certificate to a
28 user.

29 21. An article of manufacture comprising a computer

1 usable medium having computer readable program code means
2 embodied therein for causing an electronic content
3 proving method, the computer readable program code means
4 in said article of manufacture comprising computer
5 readable program code means for causing a computer to
6 effect the steps of claim 1.

7 22. A computer program product comprising a computer
8 usable medium having computer readable program code means
9 embodied therein for causing a proving system, the
10 computer readable program code means in said computer
11 program product comprising computer readable program code
12 means for causing a computer to effect the system of
13 claim 10.

14 23. A computer program product comprising a computer
15 usable medium having computer readable program code means
16 embodied therein for causing a proving system, the
17 computer readable program code means in said computer
18 program product comprising computer readable program code
19 means for causing a computer to effect the system of
20 claim 16.

21 24. A computer program product comprising a computer
22 usable medium having computer readable program code means
23 embodied therein for causing proof of openness for
24 perusal or non-alteration of an electronic content, the
25 computer readable program code means in said computer
26 program product comprising computer readable program code
27 means for causing a computer to effect the system of
28 claim 18.